

Appl. No. 10/689,483  
Amdt. dated April 4, 2006  
Reply to Office Action of October 4, 2005  
Attorney Docket 17205

**AMENDMENTS TO THE CLAIMS**

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (currently amended) A system for automatically raising a stabilizer of a work vehicle, comprising:

a proportional control operator input device configured to signal both a plurality of upward stabilizer raising rates and a plurality of stabilizer lowering rates;

at least one electronic controller configured to receive a signal indicating a commanded raising rate and a commanded lowering rate from the input device; and

at least one hydraulic valve coupled to the controller to raise and lower the stabilizer in response to rate signals received from the controller;

wherein;

the controller has a first mode of operation in which it signals the at least one valve to raise and lower the stabilizer proportionate to the position of the input device; and further wherein the controller has a second mode of operation in which it automatically raises the stabilizer to a predetermined higher up position; and

the controller is configured to change from the first mode of operation to the second mode of operation based upon the operator's positioning of the input device in at least one position of a range of positions for a period of time.

2-3. (cancelled)

4. (original) The system of claim 1, wherein the controller is configured to exit the second mode of operation when the stabilizer reaches the predetermined higher up position.

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5. (original) The system of claim 4, wherein the predetermined higher up position is indicated by a hydraulic pressure spike.

6. (original) The system of claim 5, wherein the controller is configured to monitor a sensor responsive to the hydraulic pressure spike.

7. (original) The system of claim 4, wherein the controller is configured to leave the second mode of operation at least after a predetermined period of time by closing the at least one valve.

8. (currently amended) The system of claim 1-3, wherein the controller is configured to leave the second mode of operation at least when the operator does not release the input device.

9. (currently amended) A system for automatically raising a stabilizer of a work vehicle, comprising:

an input device configured to generate signals indicating a plurality of stabilizer rates of movement;

an electronic controller configured to receive the signals from the input device and generate corresponding valve signals; and

at least one hydraulic valve coupled to the controller to move the stabilizer in response to the valve signals;

wherein:

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the controller has a first mode of operation in which it configured to signal the at least one hydraulic valve to raise and lower the stabilizer proportionate to the input device position<sub>1</sub>, and further wherein

the controller has a second mode of operation in which it automatically raises the stabilizer to a predetermined upper position; and

the controller is configured to change from the first mode of operation to the second mode of operation based upon the operator's positioning of the input device in at least one position of a range of positions for a period of time.

10-11. (cancelled)

12. (original) The system of claim 9, wherein the controller is configured to exit the second mode of operation when the stabilizer reaches the predetermined upper position.

13. (original) The system of claim 12, wherein the controller determines the predetermined upper position by sensing a hydraulic pressure spike.

14. (original) The system of claim 13, wherein the controller is configured to monitor a sensor responsive to the hydraulic pressure spike.

15. (original) The system of claim 12, wherein the controller is configured to leave the second mode of operation at least after a predetermined period of time by closing the at least one valve.

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16. (currently amended) The system of claim 9 +1, wherein the controller is configured to leave the second mode of operation at least when the operator does not release the input device.

17. (original) The system of claim 9, further comprising:

a second input device configured to generate second signals indicating a plurality of stabilizer rates of movement for a second stabilizer;

wherein the controller is configured to receive the second signals from the second input device and generate corresponding second valve signals; and

at least a second hydraulic valve coupled to the controller to move the second stabilizer in response to the second valve signals;

wherein the controller is further configured to control the stabilizer and the second stabilizer independently of one another in both the first and second modes of operation.

18. (original) The system of claim 9, wherein the controller is configured to damp stabilizer movement in the first mode of operation, and further wherein the controller is configured to enter a third, less damped, proportional control mode of operation.

19. (original) The system of claim 18 wherein the controller is configured to enter the third mode when an operator oscillates the input device.

20. (original) The system of claim 19, wherein the controller is configured to enter the third mode based at least on sensing a predetermined number of oscillations of the input device.

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21. (cancelled)

22. (currently amended) ~~The system of claim 21.~~ A system for automatically moving a stabilizer of a work vehicle, comprising:  
an operator manipulable input device configured to generate signals indicating a plurality of stabilizer rates of movement;  
an electronic controller configured to receive the signals from the input device and generate corresponding valve signals; and  
at least one hydraulic valve coupled to the controller to move the stabilizer in response to the valve signals;  
wherein the controller has a first mode of operation in which it is configured to signal the at least one hydraulic valve to raise and lower the stabilizer proportionate to the input device position at least a first ramp rate, wherein the controller has a second mode of operation in which it raises and lowers the stabilizer proportionate to the input device position at at least a second ramp rate different from the first ramp rate, and further wherein the controller is configured to automatically switch from the first ramp rate to the second ramp rate based at least upon a first movement of the operator input device.

23. (currently amended) The system of claim 22, wherein the controller is configured to automatically switch from the second ramp rate to the first ramp rate based at least upon a second movement of the operator input device being of a different magnitude than the magnitude of the first movement.

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24. (currently amended) The system of claim 23 ~~42~~, wherein the first movement includes (a) moving the operator input device above a first threshold position, and (b) moving the operator input device below a second threshold position.

25. (original) The system of claim 24, wherein the operator input device has a central position, and further wherein one of the first and second threshold positions is on one side of the central position and the other of the first and second threshold position is on the other side of the central position.

26. (original) The system of claim 25, wherein the operator input device is a joystick configured to generate joystick signals generally proportional to the positions of the joystick.

27. (currently amended) The system of claim ~~22~~ 24, wherein the controller is configured to change from the first to the second ramp rate when the operator moves the operator input device back and forth.

28. (original) The system of claim 27, wherein the controller is configured to change from the first to the second ramp rate when the operator moves the operator input device back and forth at least once within a predetermined time interval.

29. (original) The system of claim 28, wherein each movement of the operator input device must take no more than 800 milliseconds.

30. (original) A method of shaking a stabilizer controlled by a joystick, including the steps of:

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moving the joystick rapidly back and forth;  
  
electronically monitoring the rapid joystick back-and-forth movement; and  
  
reducing a stabilizer damping rate responsive to the monitored back and forth  
movement.

31. (original) The method of claim 30, wherein the step of electronically monitoring includes  
a step of determining a number of back-and-forth joystick movements.

32. (original) The method of claim 31, wherein the step of electronically monitoring includes  
a step of determining an elapsed time of the back and forth movements.

33. (original) The method of claim 32, wherein the step of electronically monitoring includes  
a step of determining a magnitude of the back and forth movements.